REMARKS

Applicants are in receipt of the Office Action mailed March 26, 2004. Claims 1-54 remain pending in the application. Reconsideration is respectfully requested in light of the following remarks.

Section 112, Second Paragraph, Rejection:

The Office Action rejected claims 9, 27, and 47 under 35 U.S.C. § 112, second paragraph as indefinite. Applicants traverse this rejection and further assert that claims 9, 27, and 47 do, in fact, particularly point out and distinctly claim the relevant subject matter.

Regarding claims 9, 27, and 47, the Examiner contends that the term "in physical proximity" is a relative term that renders the claim indefinite and further argues that "in physical proximity" is not defined by the claim and that the specification does not provide a standard for ascertaining the requisite degree. Applicants respectfully submit that using the phrase "in physical proximity" when referring to computer devices communication with each other is clear. Applicant also submits that not only is it clear, it is well known in the art to use the phrase "in physical proximity" when referring to two devices communicating with each other. In term "in physical proximity" is well understood in the art of computing devices. Those of ordinary skill in the art readily understand and use this terminology. Numerous types of physical proximity computing devices are known to those of ordinary skill in the art. Applicants should not be required to limit their claims to any particular device or range. Those of ordinary skill in the art understand the difference between physical proximity based communications and other types of communication, such as traditional network communications. Thus, removal of the 112 rejection of claims 9, 27, and 47 is respectfully requested.

Section 102(e) Rejection:

The Office Action rejected claims 1, 4, 7, 9, 11, 19, 22, 25, 27, 29, 37-39, 42, 45, 47 and 49 under 35 U.S.C. § 102(e) as being anticipated by Huttunen, et al. (U.S. Patent 6,356,761) (hereinafter "Huttunen"). Applicants assert that pending claims 1, 4, 7, 9, 11, 19, 22, 25, 27, 29, 37-39, 42, 45, 47 and 49 are not anticipated by Huttunen for the following reasons.

Regarding claim 1, Huttunen fails to teach a method for accessing a proximity service, comprising: a client device forming a direct point-to-point communication link with a service device; the client device directly requesting to the service device a document that describes an interface to access a service provided by the service device; the client device receiving said document directly from the service device wherein said document comprises information describing how to access the service; wherein said requesting and said receiving are performed over said direct point-to-point communication link; and the client device using the information from said document to access the service, as the Examiner contends. Applicants disagree with the Examiner's characterization of Huttunen.

Huttunen teaches a method for providing geographic location based information, such as maps, time tables, or tourist information, to mobile users based upon the location of the base station to which a user connects (Huttunen, abstract, column 2, lines 2-9, lines 36-41). In Huttunen's system, a mobile user connects to a base station and the network uses a predetermined location of the base station to determine and provide information germane to the mobile user's geographic location (Huttunen, column 2, lines 54-67). Applicants assert that Huttunen fails to teach a client device directly requesting to the service device a document that describes an interface to access a service provided by the service device. In contrast, Huttunen teaches that location information is identified and determined by a mobile telephone system that is capable of determining the area a subscriber is currently roaming (Huttunen, column 9, lines 21-43). The location information is then used when accessing WWW documents, such as by inserting it into a

standard URL form (Huttunen, column 10, line 54 – column 11, line 3). Applicants can find no teaching in Huttunen regarding a client device directly requesting a document that describes an interface to access a service provided by the service device, as the Examiner contends.

Further, Huttunen fails to teach that the requested document comprises information describing how to access the service. Instead, Huttunen teaches that the requested document includes predefined location information based upon the specific base station through which a mobile user is connecting. This location information in then included in future Internet requests to help ensure that any retrieved documents are pertinent to the user's location (Huttunen, column 3, lines 35-51). While the location information for the mobile user is included in further Internet requests, Huttunen clearly describes this occurring through standard Internet, HTTP, or SMS based requests (Huttunen, column 9, lines 11-20, column 10, line 54- column 11, line 3).

Additionally, Huttunen also fails to teach the client device using the information from said document to access the service, as the Examiner contends. In contrast, Huttunen teaches that a mobile client, after receiving the local information regarding the geographic location of the client, includes such information while continuing to use standard Internet communication for browsing and viewing documents. (Huttunen, column 3, line 52 – column 4, line 15). Huttunen clearly describes how the location information is used with the http protocol (Huttunen, column 10, lines 54-67). Thus, while Huttunen does teach that a client may include the location information when accessing the internet, Huttunen clearly fails to teach the client device using the information from said document to access a service.

In light of the above remarks, applicants assert that the rejection of claim 1 is not supported by the cited art and withdrawal of the rejection is respectfully requested. Similar remarks as discussed above in regard to claim 1 apply to claims 19, 37, 38, and 39.

Regarding claim 4, applicants assert that Huttunen fails to teach wherein said document comprises a service advertisement for the service, wherein said service advertisement comprises a schema specifying an interface to at least a portion of the service, as the Examiner states. Applicants can find no reference in Huttunen regarding either a service advertisement for a service or a schema that specifies an interface for the service. The passage cited by the Examiner described how a mobile client accesses the Internet and retrieves documents from a WWW server appropriate for the geographic location of the mobile user as determined by the network (Huttunen, column 9, lines 21-43). Rather than obtaining a service advertisement for a service, a mobile client under Huttunen receives a document including information identifying the mobile client's geographic location. Huttunen describes how this might simply be a word, such as "Helsinki" that can be included in future http requests, or that can be used in a standard URL form, to obtain information related to a particular geographic area (Huttunen, column 10, line 58-column 11, line 3). Thus, Huttunen clearly fails to teach a client device receiving a document that comprises a service advertisement for a service and wherein the service advertisement comprises a schema specifying an interface to at least a portion of the service.

In light of the above remarks, applicants assert that the rejection of claim 4 is not supported by the cited art and withdrawal of the rejection is respectfully requested. Similar remarks as discussed above in regard to claim 4 apply to claims 22, and 42.

Regarding claim 7, the Examiner claims that Huttunen teaches a method wherein "said receiving comprises receiving said document in an advertising request response message sent from the service over said direct point-to-point communication link, wherein the advertisement request response message is in a data representation language." Applicants disagree with the Examiner's characterization of Huttunen. Applicants can find no reference in Huttunen regarding any advertising request response messages and also can find no reference in Huttunen regarding such a message being in a data representation language. In fact, applicants can find no reference in Huttunen mentioning a data representation language at all. Actually, Huttunen teaches that after a

mobile client connects to a mobile network "according to the known principles of roaming," the mobile network may transmit to the mobile client an indication, in the form of a standard URL, of the geographic location of the mobile client. The mobile client may then include such information in further communication with the mobile network to request information related to the mobile client's location (Huttunen, column 9, lines 3-21). Huttunen does not mention advertising request response messages or that data representation language may be used for such a response message. Applicants can find no relevance of returning geographic location information in the form of a URL to receiving an advertising request response message in a data representation language sent from a service, as the Examiner asserts.

In light of the above remarks, applicants assert that the rejection of claim 7 is not supported by the cited art and withdrawal of the rejection is respectfully requested. Similar remarks as discussed above in regard to claim 7 apply to claims 25, and 45.

Claims 1-9, 11-15, 19-27, 29-33, 37-47 and 49-54 were rejected as being anticipated by "An Architecture for a Secure Service Discovery Service", by Czerwinski, et al. (hereinafter "Czerwinski"). Applicants assert that pending claims 1-9, 11-15, 19-27, 29-33, 37-47 and 49-54 are note anticipated by Czerwinski for the following reasons.

Regarding claim 1, applicants disagree with the Examiner's characterization of Czerwinski and assert that Czerwinski fails to teach a method comprising a client device forming a direct point-to-point communication link with a service device; the client device directly requesting to the service device a document that describes an interface to access a service provided by the service device; the client device receiving said document directly from the service device wherein said document comprises information describing how to access the service; wherein said requesting and said receiving are performed over said direct point-to-point communication link; and the client device using the information from said document to access the service.

Czerwinski teaches a secure service discover service that allows clients to discover available services by communication with a SDS server that in turn collects information from services and matches service descriptions against client queries (Czerwinski, Introduction). Under Czerwinski, a client sends a query to an SDS server that matches the client query against XML based service descriptions to find an appropriate service for the client. While Czerwinski describes a system for discovering or locating services on a network, Czerwinski fails to teach anything regarding how a client communicates with and utilizes a discovered service.

Applicants can find no teaching in Czerwinski regarding a client directly communicating with a service device and requesting a document that describes an interface to a service provided by the service device. In contrast, Czerwinski defines services as "applications with *well-known interfaces* that perform computation or actions on behalf of client users" (Emphasis added, Czerwinski, Introduction, paragraph 1). Thus, under Czerwinski there is no need for a client to request a document describing an interface to a service provided by a service device since, under Czerwinski, services have well-known interfaces. Therefore, applicants assert that Czerwinski teaches away from a client requesting a document describing an interface to a service.

Further, applicants can find no teaching in Czerwinski regarding a client receiving such a document directly from a service device. In fact, Czerwinski does not describe any direct communication between a client device and service device. Instead, Czerwinski describes client devices communicating with SDS servers to find services (Czerwinski, section 3.1, paragraph 5).

Additionally, Czerwinski fails to teach a client receiving a document that comprises information describing how to access the service. Applicants can find no reference in Czerwinski regarding a client receiving such a document. As described above, Czerwinski teaches that services use well-known interfaces. Thus, under Czerwinski, there is no need for a client to receive a document describing how to access a service since such a service has a well-known interface. Also, since Czerwinski fails to

teach a client receiving such a document, applicants assert that Czerwinski must necessarily fail to teach a client device using the information from such a document to access the service.

In light of the above remarks, applicants assert that the rejection of claim 1 is not supported by the cited art and withdrawal of the rejection is respectfully requested. Similar remarks as discussed above in regard to claim 1 apply to claims 19, 37, 38, and 39.

Regarding claim 2 and in contrast to the Examiner's claim, applicants assert that Czerwinski fails to teach a method wherein said requesting comprises the client sending an advertisement request message for a service to the service device over a direct point-to-point communication link. In contrast, Czerwinski teaches a system wherein client devices send queries to SDS servers to locate services. In response an SDS server compares the client query against service descriptions previously supplied by various services (Czerwinski, Introduction, and section 3.1, paragraph 5). Further, as described above, Czerwinski teaches that services use well-known interfaces. Thus, under Czerwinski, a client does not send advertisement request messages to a service, but rather sends queries to an SDS server to locate a service and later communicates with a discovered service through its well-known interface.

Thus, in light of the above remarks, applicants assert that the rejection of claim 2 is not supported by the cited art and withdrawal of the rejection is respectfully requested. Similar remarks as discussed above in regard to claim 2 apply to claims 20, and 40.

Regarding claim 4, applicants disagree with the Examiner's contention that Czerwinski teaches a method wherein a client requests a document that describes an interface to access a service wherein said document comprises a service advertisement for the service, wherein said service advertisement comprises a schema specifying an interface to at least a portion of the service. In contrast, Czerwinski teaches a service discover system wherein clients locate desired services by sending queries to SDS servers

and wherein services use well-known interfaces (Czerwinski, Introduction). Czerwinski is concerned about service discovery and does not teach anything regarding the specifics of client-service communication. Applicants can find no reference in Czerwinski that teaches a client requesting a document comprising a service advertisement for the service that comprises a schema specifying an interface to at least a portion of the service. Applicants also submit that since services under Czerwinski use well-known interfaces, there is no need for a client to request a document describing an interface to access a service.

Thus, in light of the above remarks, applicants assert that the rejection of claim 4 is not supported by the cited art and withdrawal of the rejection is respectfully requested. Similar remarks as discussed above in regard to claim 4 apply to claims 22, and 42.

Regarding claim 5, contrary to the Examiner's statement, Czerwinski fails to teach a method wherein said schema is an XML schema defining XML messages for a client to send the service and the service to send to the client in order for the client to access capabilities of the service. As described above, Czerwinski teaches that services use well-known interfaces and applicants can find no teaching or reference in Czerwinski regarding an XML schema defining XML messages for a client to send the service and the service to send the client. In contrast, Czerwinski teaches the user of XML to define service descriptions and service discover queries (Czerwinski, section 2.3). However, under Czerwinski, service descriptions and queries comprise information describing a service's capabilities and/or features for discovery, not messages sent and received from the service (Czerwinski, Figure 2, section 2.3).

Therefore, in light of the above remarks, applicants assert that the rejection of claim 5 is not supported by the cited art and withdrawal of the rejection is respectfully requested. Similar remarks as discussed above in regard to claim 5 apply to claims 23, and 43.

Regarding claim 6, Czerwinski does not teach a method wherein a client device using the information from the document comprises the client sending one or more of the XML messages to the service over the direct point-to-point communication link. Applicants disagree with the Examiner's characterization of Czerwinski. As discussed above, Czerwinski teaches a method for service discovery involving clients sending queries to SDS servers that match the queries against service descriptions previously supplied by services. Under Czerwinski, clients use well-known interfaces to communicate with services. (Czerwinski, Introduction, section 3.1). Applicants can find no teaching or reference in Czerwinski regarding a client sending to a service device XML messages defined in an XML schema received from the service device, as the examiner contends.

In light of the above remarks, applicants assert that the rejection of claim 6 is not supported by the cited art and withdrawal of the rejection is respectfully requested. Similar remarks as discussed above in regard to claim 6 apply to claims 24, and 44.

Section 103(a) Rejection:

The Office Action rejected claims 10, 28 and 48 under 35 U.S.C. § 103(a) as being unpatentable over Czerwinski.

In regard to claims 10, 28 and 48, the Examiner takes official notice that an infrared link is an obvious choice for a wireless link. Pursuant to M.P.E.P. § 2144.03, Applicant traverses the Examiner's taking of official notice. Even if infrared was a well known communication mechanism in other contexts, the Examiner has not shown why it would be proper to modify the teachings of Czerwinski to employ an infrared communication link. Czerwinski requires the use of specific communication protocols. The Examiner has not shown that the prior art teaches the desirability to modify Czerwinski to employ infrared communications and that Czerwinski's system would still be able to function as intended if so modified. Pursuant to M.P.E.P. § 2144.03 Applicants assert that "the examiner must provide documentary evidence in the next

Office action if the rejection is to be maintained." See also 37 CFR 1.104(c)(2), (d)(2) and *In re Zurko*, 258 F.3d 1379, 1386 (Fed. Cir. 2001).

Furthermore, applicants assert that claims 10, 28, and 48, are patentable over Czerwinski because the respective independent claim from which they depend are, as shown through the arguments above, to be patentable over Czerwinski.

Claims 16-18, 34-36 and 52-54 were rejected as being unpatentable over Czerwinski in view of Bell (U.S. Patent 6,405,027).

Regarding claim 16, applicants assert that the Examiner has improperly combined Bell and Czerwinski for at least the reasons given below.

Czerwinski teaches a method for secure discovery of services through the user of SDS servers while Bell teaches a mobile communication handset, or cellular phone, configured to include other mobile communication devices in a group call utilizing Bluetooth Intercom Profile (Czerwinski, Abstract, Bell, Abstract). Applicants can imagine no feasible manner to combine Bell system for implementing group calls through Bluetooth enabled cell phones with the Secure Service Discovery system of Czerwinski.

Additionally, even if one could combine the Bluetooth based group call capabilities of Bell with the secure service discovery capabilities of Czerwinski, such a combination would be counter to the intended purpose of Czerwinski. Czerwinski is concerned with a secure method for client to discover desired services within a network. A central feature of Czerwinski's system is the use authenticated RMI and "encryption of all information sent between system entities (i.e. between clients and SDS servers and between services and SDS servers)." (Czerwinski, section 2.4). Additionally, Czerwinski teaches that client interact with a Capability Manger configured to ensure that clients have the proper rights needed to access certain services (Czerwinski, section 3.4). Thus, applicants assert that it would be counterintuitive to obviate the security taught be Czerwinski by allow a client to act as a bridge and forward communications to other

devices. Applicants also remind the Examiner of M.P.E.P. § 2143.01, paragraph 10, that states, "[i]f the proposed modification would render the prior art invention being modified unsatisfactory for its intended purpose, then there is no suggestion or motivation to make the proposed modification."

Further, applicants can find no reference in Czerwinski or Bell, either separately or in combination, which suggests any desirability to modify Czerwinski according to Bell. Applicants remind the Examiner of M.P.E.P. § 2143.01, paragraph 8, which states, "[t]he mere fact that references can be combined or modified does not render the resultant combination obvious unless the prior art also suggests the desirability of the combination."

Applicants assert that the combination of Czerwinski and Bell is improper and thus the rejection of claims 16-18, 34-36, and 52-54 based us such a combination is also improper and its removal is respectfully requested.

Applicants also assert that numerous ones of the dependent claims recited further distinctions over the cited art. However, since the independent claims have been shown to be patentably distinct, a further discussion of the dependent claims is not necessary at this time.

CONCLUSION

Applicants submit the application is in condition for allowance, and notice to that effect is respectfully requested.

If any extension of time (under 37 C.F.R. § 1.136) is necessary to prevent the above referenced application from becoming abandoned, Applicants hereby petition for such extension. If any fees are due, the Commissioner is authorized to charge said fees to Meyertons, Hood, Kivlin, Kowert, & Goetzel, P.C. Deposit Account No. 501505/5181-72300/RCK.

Also enclosed herewith are the following items:

☒ Return Receipt Postcard

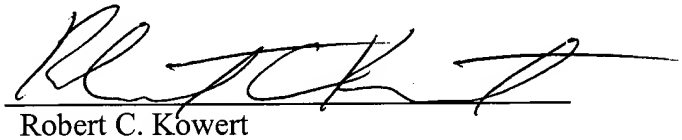
☐ Petition for Extension of Time

☐ Notice of Change of Address

☐ Fee Authorization Form authorizing a deposit account debit in the amount of $ for fees ( ).

☐ Other:

Respectfully submitted,



Robert C. Kowert
Reg. No. 39,255
ATTORNEY FOR APPLICANT(S)

Meyertons, Hood, Kivlin, Kowert, & Goetzel, P.C.
P.O. Box 398
Austin, TX 78767-0398
Phone: (512) 853-8800

Date: June 28, 2004